



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

NOTICE OF ALLOWANCE AND FEE(S) DUE

7590

05/02/2008

David L. Fehrman
Morrison & Foerster LLP
35th Floor
555 W. 5th Street
Los Angeles, CA 90013

EXAMINER

FAULK, DEVONA E

ART UNIT

PAPER NUMBER

2615

DATE MAILED: 05/02/2008

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/617,106	07/09/2003	Masaru Aiso	393032039100	2612

TITLE OF INVENTION: LEVEL ADJUSTMENT APPARATUS

APPLN. TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	NO	\$1440	\$300	\$0	\$1740	08/04/2008

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. **PROSECUTION ON THE MERITS IS CLOSED.** THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN **THREE MONTHS** FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. **THIS STATUTORY PERIOD CANNOT BE EXTENDED.** SEE 35 U.S.C. 151. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

HOW TO REPLY TO THIS NOTICE:

I. Review the SMALL ENTITY status shown above.

If the SMALL ENTITY is shown as YES, verify your current SMALL ENTITY status:

A. If the status is the same, pay the TOTAL FEE(S) DUE shown above.

B. If the status above is to be removed, check box 5b on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and twice the amount of the ISSUE FEE shown above, or

If the SMALL ENTITY is shown as NO:

A. Pay TOTAL FEE(S) DUE shown above, or

B. If applicant claimed SMALL ENTITY status before, or is now claiming SMALL ENTITY status, check box 5a on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and 1/2 the ISSUE FEE shown above.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail **Mail Stop ISSUE FEE**
Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450
 or Fax **(571)-273-2885**

INSTRUCTIONS: This form should be used for transmitting the ISSUE FEE and PUBLICATION FEE (if required). Blocks 1 through 5 should be completed where appropriate. All further correspondence including the Patent, advance orders and notification of maintenance fees will be mailed to the current correspondence address as indicated unless corrected below or directed otherwise in Block 1, by (a) specifying a new correspondence address; and/or (b) indicating a separate "FEE ADDRESS" for maintenance fee notifications.

CURRENT CORRESPONDENCE ADDRESS (Note: Use Block 1 for any change of address)

7590 05/02/2008

David L. Fehrman
 Morrison & Foerster LLP
 35th Floor
 555 W. 5th Street
 Los Angeles, CA 90013

Note: A certificate of mailing can only be used for domestic mailings of the Fee(s) Transmittal. This certificate cannot be used for any other accompanying papers. Each additional paper, such as an assignment or formal drawing, must have its own certificate of mailing or transmission.

Certificate of Mailing or Transmission

I hereby certify that this Fee(s) Transmittal is being deposited with the United States Postal Service with sufficient postage for first class mail in an envelope addressed to the Mail Stop ISSUE FEE address above, or being facsimile transmitted to the USPTO (571) 273-2885, on the date indicated below.

(Depositor's name)
(Signature)
(Date)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/617,106	07/09/2003	Masaru Aiso	393032039100	2612
TITLE OF INVENTION: LEVEL ADJUSTMENT APPARATUS				

APPLN. TYPE	SMALL ENTITY	ISSUE FEE DUE	PUBLICATION FEE DUE	PREV. PAID ISSUE FEE	TOTAL FEE(S) DUE	DATE DUE
nonprovisional	NO	\$1440	\$300	\$0	\$1740	08/04/2008

EXAMINER	ART UNIT	CLASS-SUBCLASS
FAULK, DEVONAE	2615	381-104000

1. Change of correspondence address or indication of "Fee Address" (37 CFR 1.363).

- ☐ Change of correspondence address (or Change of Correspondence Address form PTO/SB/122) attached.
☐ "Fee Address" indication (or "Fee Address" Indication form PTO/SB/47; Rev 03-02 or more recent) attached. Use of a **Customer Number is required.**

2. For printing on the patent front page, list

- (1) the names of up to 3 registered patent attorneys or agents OR, alternatively, 1 _____
 (2) the name of a single firm (having as a member a registered attorney or agent) and the names of up to 2 registered patent attorneys or agents. If no name is listed, no name will be printed. 2 _____
 3 _____

3. ASSIGNEE NAME AND RESIDENCE DATA TO BE PRINTED ON THE PATENT (print or type)

PLEASE NOTE: Unless an assignee is identified below, no assignee data will appear on the patent. If an assignee is identified below, the document has been filed for recordation as set forth in 37 CFR 3.11. Completion of this form is NOT a substitute for filing an assignment.

(A) NAME OF ASSIGNEE

(B) RESIDENCE: (CITY AND STATE OR COUNTRY)

Please check the appropriate assignee category or categories (will not be printed on the patent): ☐ Individual ☐ Corporation or other private group entity ☐ Government

4a. The following fee(s) are submitted:

- ☐ Issue Fee
☐ Publication Fee (No small entity discount permitted)
☐ Advance Order - # of Copies _____

4b. Payment of Fee(s): (Please first reapply any previously paid issue fee shown above)

- ☐ A check is enclosed.
☐ Payment by credit card. Form PTO-2038 is attached.
☐ The Director is hereby authorized to charge the required fee(s), any deficiency, or credit any overpayment, to Deposit Account Number _____ (enclose an extra copy of this form).

5. Change in Entity Status (from status indicated above)

- ☐ a. Applicant claims SMALL ENTITY status. See 37 CFR 1.27. ☐ b. Applicant is no longer claiming SMALL ENTITY status. See 37 CFR 1.27(g)(2).

NOTE: The Issue Fee and Publication Fee (if required) will not be accepted from anyone other than the applicant; a registered attorney or agent; or the assignee or other party in interest as shown by the records of the United States Patent and Trademark Office.

Authorized Signature _____ Date _____
 Typed or printed name _____ Registration No. _____

This collection of information is required by 37 CFR 1.311. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, Virginia 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450.

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it displays a valid OMB control number.



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/617,106

07/09/2003

Masaru Aiso

393032039100

2612

7590

05/02/2008

EXAMINER

FAULK, DEVONA E

ART UNIT

PAPER NUMBER

2615

DATE MAILED: 05/02/2008

David L. Fehrman
Morrison & Foerster LLP
35th Floor
555 W. 5th Street
Los Angeles, CA 90013

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b) (application filed on or after May 29, 2000)

The Patent Term Adjustment to date is 611 day(s). If the issue fee is paid on the date that is three months after the mailing date of this notice and the patent issues on the Tuesday before the date that is 28 weeks (six and a half months) after the mailing date of this notice, the Patent Term Adjustment will be 611 day(s).

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (<http://pair.uspto.gov>).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 or (571)-272-4200.

Notice of Allowability**Application No.**

10/617,106

Applicant(s)

AISO ET AL.

Examiner

DEVONA E. FAULK

Art Unit

2615

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to amendment filed on 1/15/08.
2. ☒ The allowed claim(s) is/are 3,5,7 and 9-11.
3. ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☒ All b) ☐ Some* c) ☐ None of the:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
(a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
(b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☒ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3. ☐ Information Disclosure Statements (PTO/SB/08),
Paper No./Mail Date _____
4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material
5. ☐ Notice of Informal Patent Application
6. ☐ Interview Summary (PTO-413),
Paper No./Mail Date _____
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other _____.

DETAILED ACTION

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 1/7/08 has been entered.

Response to Arguments

1. The applicant agreed to an examiner's amendment to place the claims in allowable form.
2. Claims 1-2,4,6 and 8 are cancelled.

EXAMINER'S AMENDMENT

3. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it **MUST** be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Hristo Vachovski (Reg. No. 55,694) on 4/18/08.

The claims are to be amended as follows:

Claim 3 is to be amended to recite:

3. A level adjustment apparatus including a plurality of operators each operable in both a level increasing direction and a level decreasing direction, individual ones of said operators having respective set values associated therewith, said level adjustment apparatus comprising:

a grouping section that individually sets each of operators, selected from among said plurality of operators, to a forward or inverse operational direction, so that at least one operator is set in the forward operational direction and at least one operator is set to the inverse operational direction, and groups the selected operators into one or more groups; ~~and~~

a level control section that, when any one of said operators in one of the groups is operated, controls each of the set values of the operators in the one group in accordance with an operated amount generated through operation of the operated operator in such a manner that the set value of the at least one operator set to the forward operational direction is controlled by adding the operated amount while the set value of the at least one operator set to the inverse operational direction is controlled by subtracting the operated amount,

wherein a sign of a value of the operated amount is same for a first case where the operated operator is an operator set to the forward operational direction and has been operated in an increasing direction and a second case where the operated operator is an operator set to the inverse operational direction and has been operated in a decreasing direction, and the sign of the value of the operated amount is same between a third case where the operated operator is an operator set to the forward

operational direction and has been operated in the decreasing direction and a fourth case where the operated operator is an operator set to the inverse operational direction and has been operated in the increasing direction, the sign of the value of the operated amount being different between the first and second cases and the third and fourth cases.

whereby, when any one of said operators in one of the groups is operated in a particular direction, said level control section performs control to actually move a respective position of each of other said operator in the one group, set to a same operational direction as the operated operator, in a same direction as the particular direction in which the one operator is operated, and performs control to actually move a respective position of each of other said operator in the one group, set to an opposite operational direction from the operated operator, in an opposite direction from the particular direction;

a grouped state display section that displays respective grouped states of said operators grouped by said grouping section; and

an operational direction display section that displays respective operational directions of said operators set via said grouping section.

Claim 5 is to be amended to recite:

5. A level adjustment apparatus for controlling control values of a plurality of operators each controllable in both a level increasing direction and a level decreasing direction, said level adjustment apparatus comprising:

a collective control operator that collectively controls the control values of said plurality of operators;

a setting section that individually sets each of said plurality of operators to a forward or inverse operational direction, so that at least one operator is set in the forward operational direction and at least one operator is set to the inverse operational direction; and

a level control section that, when said collective control operator is operated, controls each of the control values of said plurality of operators in accordance with an operated amount generated through operation of the collective control operator in such a manner that the control value of the at least one operator set to the forward operational direction is controlled by adding the operated amount while the control value of the at least one operator set to the inverse operational direction is controlled by subtracting the operated amount.

wherein a sign of a value of the operated amount is different between a first case where the collective control operator is operated in an increasing direction and a second case where the collective control operator is operated in a decreasing direction.

whereby, when said collective control operator is operated in a particular direction, performs control to actually move a respective position of each of said plurality of operators, set to the forward operational direction, in a same direction as the particular direction in which said collective control operator is operated, and performs

Art Unit: 2615

control to actually move a respective position of each of said plurality of operators, set to the inverse operational direction, in an opposite direction from the particular direction; and

a display section that displays respective ones of the operational directions of said plurality of operators set via said setting section.

Claim 7 is to be amended to recite:

7. A level adjustment apparatus for controlling control values of a plurality of operators each controllable in both a level increasing direction and a level decreasing direction, said level adjustment apparatus comprising:

a collective control operator that collectively controls the control values of said plurality of operators;

a setting section that assigns at least two operators, selected from among said plurality of operators, to said collective control operator, and individually sets each of said at least two operators, assigned to said collective control operator, to a forward or inverse operational direction so that at least one operator is set in the forward operational direction and at least one operator is set to the inverse operational direction;

a level control section that, when said collective control operator is operated, controls each of the control values of said at least two operators in accordance with an operated amount generated through operation of the collective control operator in such a manner that the control value of the at least one operator set to the forward operational direction is controlled by adding the operated amount while the control value

of the at least one operator set to the inverse operational direction is controlled by subtracting the operated amount,

wherein a sign of a value of the operated amount is different between a first case where the collective control operator is operated in an increasing direction and a second case where the collective control operator is operated in a decreasing direction,

whereby, when said collective control operator is operated in a particular direction, performs control to actually move a respective position of each of said at least two operators, assigned to said collective control operator and set to the forward operational direction, in a same direction as the particular direction in which said collective control operator is operated, and performs control to actually move a respective position of each of the operators, assigned to said collective control operator and set to the inverse operational direction, in an opposite direction from the particular direction; and

a display section that displays respective ones of the operational directions of said plurality of channels set via said setting section.

Allowable Subject Matter

4. Claims 3,5,7,9-11 are allowed.

The following is an examiner's statement of reasons for allowance: Regarding claims 3,5 and 7, prior art over Suzuki (US 5,054,077) discloses a level adjustment apparatus including a plurality of operators each operable in both a level increasing

direction and a level decreasing direction (Figures 1 and 5), said level adjustment apparatus comprising: a grouping section that individually sets each of operators, selected from among said plurality of operators, to a forward or inverse operational direction, and groups the selected operators into one or more groups (faders 31-33; switching unit 54 which selects between a single or group operational mode; column 4, lines 25-64; specifically lines 34-38 disclose that when one fader operator of a group is moved than another fader of the same group is displaced in the same direction ; and a level control section that, when any one of said operators in one of the groups is operated in a particular direction, performs control to actually move a respective position of each of other said operator in the one group, set to a same operational direction as the operated operator, in a same direction as the particular direction in which the one operator is operated, and performs control to actually move a respective position of each of other said operator in the one group, (faders 31-33, fader operators 40 and switching unit 54 which selects between a single or group operational mode; column 4, lines 25-64; specifically lines 34-38 disclose that when one fader operator of a group is moved than another fader of the same group is displaced in the same direction);an operation direction display section that displays respective operational directions of said operators set via said grouping section (Figure 5,; the faders themselves form a display). Prior art Kohyama discloses a display section that displays respective states of said operators (Figure 6; column 6,lines 3-12,indicator units 28-1-28-8). The examiner takes official notice that programs or instructions can be written such that a display can display whatever the user wants displayed. It would have been obvious to

nmodify Suzuki as modified by Kohyama so that the display would indicate group states in order to provide more information visibly to the user. In general, the prior art teaches of faders that can be move in a forward and backward direction.

Regarding claim 3, the prior art or combination thereof fails to disclose or make obvious wherein a sign of a value of the operated amount is same for a first case where the operated operator is an operator set to the forward operational direction and has been operated in an increasing direction and a second case where the operated operator is an operator set to the inverse operational direction and has been operated in a decreasing direction, and the sign of the value of the operated amount is same between a third case where the operated operator is an operator set to the forward operational direction and has been operated in the decreasing direction and a fourth case where the operated operator is an operator set to the inverse operational direction and has been operated in the increasing direction, the sign of the value of the operated amount being different between the first and second cases and the third and fourth cases.

Regarding claims 5 and 7 the prior art or combination thereof fails to disclose or make obvious wherein a sign of a value of the operated amount is different between a first case where the collective control operator is operated in an increasing direction and a second case where the collective control operator is operated in a decreasing direction.

Therefore the prior art or combination thereof fails to disclose or make obvious a level adjustment apparatus as claimed.

Claims 9-11 are allowed due to dependency on claims 3,5 and 7.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to DEVONA E. FAULK whose telephone number is (571)272-7515. The examiner can normally be reached on 8 am - 5 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vivian Chin can be reached on 571-272-7848. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Devona E. Faulk/

Application/Control Number: 10/617,106

Page 11

Art Unit: 2615

Examiner, Art Unit 2615

/Vivian Chin/

Supervisory Patent Examiner, Art Unit 2615